

Concepts for Electronic Waste Product Stewardship Model Printer Scenario

The purpose of this document is to outline what a product stewardship approach to collecting and managing e-waste might look like, using a specific electronic device as an example. We selected printers for this scenario because they are frequently mentioned when discussing expansion of the covered electronic waste definition. Please note this is NOT a CalRecycle proposal to establish a separate program for printers; instead, it is an example for discussion purposes to illustrate the types of provisions that CalRecycle staff thinks need to be included in an effective stewardship program for a given product category. This is NOT intended to be a description of transitioning the current CEW program into a new stewardship program that covers both existing CEW and additional devices.

Definitions

- Manufacturer/Producer (MFR/PR) is either 1) the person who manufactures the covered product and who sells, offers for sale, or distributes the product in the state; 2) imports the product into the state for sale or distribution; or 3) sells the product in the state.
- Stewardship Organization (SO) is an entity formed by a group of producers to act as an agent on behalf of the producers to administer a product stewardship program.

Scope

- Covered products – Desktop printers/scanners/fax machines, business and industrial printers/scanner/fax machines. For the remainder of this document, we use the term “printers” as shorthand to include all of these covered products.
- Covered entities – Households, schools, businesses, government entities, non-profit organizations.
- Includes all printers sold for use in CA by any MFR/PR including internet sales.
- Includes new, historic and orphan printers where a MFR/PR cannot be identified or is no longer in business.

Legislation – A product stewardship program for the collection and management of discarded printers would need to include:

- A sustainable funding mechanism to cover all costs of implementing a printer collection and recycling system.
- Enforceable goals; both collection rate and performance/convenience standards. Alternatively, legislation could authorize CalRecycle to establish goals by a specific date.
- Applicable anti-trust provisions to ensure a level playing field for all printer manufacturers.
- Penalties for non-compliance.
- Minimum management standards for processing printers and printer residuals.

Primary Roles and Responsibilities

- Manufacturers/Producers – Design, finance and operate the program, either as individuals or as part of a Stewardship Organization (SO). SO or individual MFR/PR submits plans describing how the goals of the program will be accomplished and subsequent reports on progress. Ensures that all entities associated with program implementation (collectors, recyclers, local governments) are reimbursed for eligible activities.
- Retailers – If a point of purchase fee is established in legislation, retailers collect the fee on sales of new printers and remit it to the SO. May accept printers from consumers as a collector and receive reimbursement from the SO.

- Collectors and Recyclers – Multiple approaches can be taken: 1) Collectors and Recyclers contract with SO to accept and appropriately handle printers in accordance with management standards and hazardous waste laws and receive reimbursement from SO; or 2) SO selects smaller group of recyclers through a competitively bid process to appropriately handle printers on their behalf and receive reimbursement from SO.
- CalRecycle – Provides oversight and enforcement of program. Reviews and approves plans, budgets and reports to determine if program goals are being met. Insures that independent third party audits are conducted for both financial and non-financial performance aspects of program implementation. Assesses fines and penalties.
- DTSC – Oversees the management of hazardous waste including discarded printers.
- Local Government Entities – Continue to accept printers as part of household hazardous waste programs as applicable. May act as collector to receive reimbursement from SO for eligible activities. Assist in public education.
- Consumers – Pay fee when purchasing a printer if a fee is established in legislation. Take discarded printers to approved collector or recycler.

Goals – Clear, measurable and enforceable goals with deadlines are established in legislation or by CalRecycle if so delegated by legislation.

- Specific Collection and/or Recycling goal – Multiple approaches can be taken: 1) Industry-wide weight-based collection and recycling goal; 2) proportional share for each registered MFR/PR based on sales of covered products. Weight based goals can include incentives (e.g. additional “credit” for devices collected in very rural areas or for legitimate reuse) and disincentives (e.g. penalty for collecting less than proportional share).
- Convenience goals – SO must provide printer collection opportunities on a continuing basis throughout the year and throughout the state; for example ____ % of residents within ____ miles of a collection center.

Financing – Legislation authorizes a financing mechanism that is sufficient to fully cover the costs of the SO’s printer collection and recycling program including state administrative costs.

- Requires program costs to be internalized in the manufacture of printers, similar to other costs of doing business; or establishes a point of purchase fee paid by the consumer when purchasing a new printer.
- Collectors, recyclers and local governments are reimbursed for appropriately managing discarded printers.
- No end of life fee is charged to consumer discarding a printer.
- Stewardship plans and budgets must provide transparency and verify that funds generated in California (through either a consumer fee or internalized into manufacturing of printers) are being spent on California-generated covered products.

Enforcement – Based on reports submitted by SO, CalRecycle determines whether program goals are met and determines appropriate corrective action including levying fines and penalties. DTSC has enforcement authority over the management of hazardous waste.

Materials Management Standards – Program operations and activities must be compliant with existing rules regarding hazardous and universal waste management for electronic devices. SO is responsible for ensuring that printers are managed for highest and best use (e.g., address source reduction, product design, reuse and material recovery in addition to recycling).

- SO ensures that downstream processors adhere to best management practices that minimize negative environmental impacts within the state and elsewhere.
- Recyclers must be R2, e-Stewards or equivalent.

- Annual report submitted by SO details end use destinations for printers and derived residuals claimed in the program.

Transparency and Accountability – SO must coordinate with members and affected stakeholders. All plans, budgets and reports are available and accessible to the public online. Independent, third party audits are required of the financial systems and the collection and processing systems including ultimate dispositions of printers and associated residuals.

Education and Outreach – SO or individual MFR/PR has lead role for consumer outreach and education. Efforts should be coordinated with retailers to ensure that point-of-purchase information is provided to consumers when purchasing a new printer. Information on how and where to recycle printers must be available on each MFR/PR's website.

Product Design – Printer MFR/PRs will make measurable progress in designing products to facilitate recycling and minimize negative environmental impacts; e.g. longevity, ease of disassembly, recycled content, reduced hazardous materials in products. "Modulated fees" can be incorporated to provide cost relief for certain environmentally desirable design features (e.g. recycled content, upgradeability); or conversely, adding a fee if environmentally undesirable features are present (e.g. amount of toxic materials).

Pros and Cons of Product Stewardship Approach for Printers

Pros

- Manufacturers and producers, rather than local governments and taxpayers, take responsibility for the management of their products.
- Those that profit from the sale of printers, or that use printers, cover the end-of-life management costs rather than the general public. Disclosing the true life cycle cost of a product might influence purchasing behavior.
- State and local government oversight costs are minimized. No additional staff required.
- Cost-free and convenient collection opportunities are available for consumers.
- A SO or individual MFR/PR has the flexibility to design and implement a collection and recycling system that works best for their industry within rules regarding management standards and accountability.
- Printers and their residuals are processed in an environmentally secure manner with appropriate oversight.
- SOs and MFR/PRs are held accountable for financial and performance practices through independent audits.

Cons

- Requires new legislation and regulations.
- Today's MFR/PRs may have to assume responsibility for printers made by other manufacturers who have gone out of business.
- Depending on how the program is designed, small recyclers and collectors could be at a competitive disadvantage.
- Depending on how the program is designed, local governments may lose control over which recycler they work with.
- Without competition, a SO may be incentivized to keep costs as low as possible, potentially resulting in discarded products not being managed to their highest and best use.

Challenges and Issues to Address

- Transition impacts; establishing a new program for a product that is not currently covered without disrupting the existing CEW program and collection/recycling infrastructure. For example, recyclers would continue to receive payments from the state for existing CEWs, but could separately receive reimbursement from a SO for managing printers.
- Incremental costs of new program.
- Determining appropriate documentation requirements; verification of CA-generated printers.
- Identifying and including a new universe of MFR/PRs.
- Researching and determining appropriate materials management standards and end use destinations for printers and derived residuals claimed in the program.